

**Technical Documentation for the
2002 Palmetto Achievement Challenge Tests
Alternate Assessment of
English Language Arts and Mathematics**



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INTRODUCTION

The South Carolina Palmetto Achievement Challenge Tests Alternate Assessment (PACT-Alt) is a state-level standards-based portfolio assessment specifically designed for students who are unable to participate in the Palmetto Achievement Challenge Tests (PACT). This document provides a brief history of the development of the PACT-Alt and describes its administration during the 2001–02 school year.

The PACT-Alt was developed in conformance with federal and state law. The 1997 amendments to the federal Individuals with Disabilities Education Act (IDEA '97) mandates that all children, including those with significant disabilities, be included in the state testing and accountability systems. The South Carolina Education Accountability Act (EAA) of 1998 provides for a performance-based accountability system that includes all students. The EAA supports South Carolina's commitment to public education and its conviction that high expectations for *all* students are vital components of the effort to improve academic performance. The South Carolina State Board of Education is directed, under the EAA, to adopt grade-specific performance-oriented educational standards in the core academic areas of English language arts, mathematics, science, and social studies.

Because the South Carolina Department of Education (SDE) had no prior experience with alternate assessments, a steering committee composed of stakeholders—special education teachers, school administrators, parents, representatives of state agencies such as the Department of Disabilities and Special Needs, and representatives from higher education—was formed. The committee was convened by the SDE's Office of Exceptional Children in May 1998, shortly after the regulations for IDEA '97 were published, to provide the SDE with recommendations regarding developing an assessment instrument to meet the federal mandate. The committee's primary purpose was to define the parameters of an alternate assessment that met federal requirements and that could be in place by July 1, 2000, for students who could not participate in the state's PACT assessments, even with accommodations and/or modifications.

The committee defined the parameters of the alternate assessment and recommended developing the document that came to be titled *Extensions and Adaptations of the South Carolina Curriculum Standards for Students Participating in Alternate Assessment* (SDE 1999). The curriculum standards and the principles for implementing alternate assessment adopted by the steering committee are the basis of the PACT-Alt. The committee affirmed that the PACT-Alt would be aligned with the South Carolina curriculum standards. The state standards provide the basis for alignment across the state education system for district and school curricula, classroom instruction, units of study, and learning experiences.

At the time that the committee first met, only one other state, Kentucky, had experience with alternate assessments for students with disabilities. Consequently, South Carolina, along with several other states, modeled its alternate assessment after Kentucky's alternate assessment, which was based on the use of portfolios. To guide the development of the PACT-Alt and to ensure that all students were included in the testing and accountability systems and would have appropriate access to instruction that is based on the South Carolina curriculum standards, the committee specified a number of principles and goals for the PACT-Alt.

PACT-Alt Principles

- All children can learn; they can be challenged with high standards and can be expected to meet them.
- Special education is an extension and an adaptation of the general education program and curriculum, rather than an alternate or separate system.
- The curriculum standards approved by the South Carolina State Board are the learning foundation for all students, including students with unique needs and abilities.
- Measurement and reporting must be defensible in terms of feasibility, validity, reliability, and comparability.
- Results of the state standards-based program must be used to improve planning, instruction, and learning.
- An alternate assessment is appropriate for the few students for whom the state assessment, even with accommodations and/or modifications, is not appropriate.
- The alternate assessment is designed for a diverse group of students and should be flexible enough to address their individual needs.

PACT-Alt Goals

- To provide evidence that students have acquired the skills and knowledge necessary to become as independent as possible
- To document the student's performance and the performance of the programs serving the student
- To incorporate best-practice instructional techniques into standards-based assessment activities
- To provide information to be used in the development of curricula that are responsive to the student's needs

After designing the guiding principles for the alternate assessment and outlining the type of assessment to be developed, the committee recommended that the SDE seek a testing contractor to develop an assessment that was responsive to the guiding principles and appropriate for the students who met the participation criteria set forth by the committee. On the basis of the input from the steering committee, the SDE developed a request for proposals from contractors to develop an alternate assessment.

Advanced Systems in Measurement and Evaluation, Inc. (ASME), was awarded the contract for the PACT-Alt in 1999. In April of 2000, the ASME changed its name to Measured Progress, Inc. (MP). The contractor was responsible for all aspects of the PACT-Alt development and administration; materials production, shipping, and processing; portfolio scoring; and results reporting. MP proceeded to develop the assessment for a year (1999–2000) and then

administered the English language arts (ELA) and mathematics alternate assessments in a statewide field test (2000–01). The first year of statewide implementation for the PACT-Alt of ELA and mathematics was in 2001–02. MP will continue to serve as the contractor until the end of the 2003–04 school year.

Upon selection of a contractor, the steering committee was disbanded and replaced with the PACT-Alt advisory committee, which was convened in November 1999 by the SDE’s Office of Assessment for the purpose of providing input to the contractor and the SDE throughout the development and implementation process. Initially the advisory committee met quarterly; it continues now to meet biannually to review the status of the process and to provide ongoing guidance. Some members of the original steering committee serve on the advisory committee; additional members were added to ensure representation from the group of teachers who are conducting the assessment.

Chapters 1 and 2 of this document provide an overview of the administration and scoring of the alternate assessments for the 2001–02 school year. Chapter 3 addresses reliability and validity.

Chapter 1

TEST ADMINISTRATION

This chapter provides an overview of the PACT-Alt administration during the 2001–02 school year.

1.1 ADMINISTRATOR TRAINING

Teachers administering the PACT-Alt were trained in half-day sessions coordinated by the SDE and MP and conducted throughout the state during August 21–30, 2001. A total of sixteen training sessions were held, and a total of approximately four hundred teachers attended. The sessions provided guidance to teachers on developing the portfolios and implementing standards-based instruction in the classroom. The teachers received the *South Carolina Palmetto Achievement Challenge Tests Alternate Assessment Portfolio Guide* (SDE 2001c), which describes in detail the procedures for test administration, provides examples of student work, and contains copies of all forms to be used and submitted with the portfolios.

District test coordinators (DTCs) were trained in a session coordinated by the SDE and MP in October 2001. During that session, MP and SDE staff provided training based on the contents of the *District Test Coordinator's Manual for PACT-Alt* (SDE 2001a), which includes detailed information about handling materials, testing, test security, and return procedures.

1.2 TIMELINE

Because the PACT-Alt is a portfolio-based assessment, its administration is a year-long process. Beginning in August 2001 and ending in April 2002, teachers or observers tracked student progress on observable skills and recorded their observations on standardized data collection sheets. The assessment consisted of four data collection periods with each period corresponding to the end of a nine-week period in the school calendar. The dual purpose for timing the data collection with the nine-week periods is that the portfolio's contents can be used to inform instruction and to meet individualized education program (IEP) reporting requirements. Consequently, the portfolio is used not only as a summative but also as a formative assessment.

1.3 MATERIALS HANDLING

All PACT-Alt administration materials were shipped from MP to the DTCs. Materials were then distributed to schools from the district offices. Materials provided for the PACT-Alt administration included ring binders for holding the students' portfolios. In early August 2001, PACT-Alt DTCs were asked to specify the number of binders their district needed. The portfolio binders were shipped to the districts in early September. Also shipped to the DTCs were copies of the *District Test Coordinator's Manual for PACT-Alt* (SDE 2001a) and the *South Carolina Palmetto Achievement Challenge Tests Alternate Assessment Portfolio Guide* (2001c). At the end

of March 2002, DTCs received a shipment from MP that contained scoring packets, bar-coded labels, instructions for affixing the labels, envelopes for schools to use to return the completed portfolios, and directions for returning the portfolios. Each scoring packet contained five machine-scannable sheets—one for demographic information and four for scores. A bar-coded label was to be affixed to each of the machine-scannable sheets and to audiocassettes and videotapes, if any, that were submitted as part of the portfolio.

1.4 TEST SECURITY

The PACT-Alt is a component of the South Carolina state assessment system and is subject to the provisions of state test security legislation (S.C. Code Ann. § 59-1-445). Any breach of test security must be reported to the State Law Enforcement Division (SLED) in accordance with the test security legislation and State Board of Education regulations. However, the portfolio nature of the PACT-Alt makes it different from the PACT, which consists of items with a traditional format.

The contents of a student's PACT-Alt portfolio are determined and collected by an instructional team and reviewed by his or her parents and a school administrator. The items on which the student is being assessed are selected by the instructional team. Unlike the PACT, which contains items that can be reused in future test administrations and are standardized across students or are the same for all students in a grade and a subject, the items in the PACT-Alt are student-specific.

PACT-Alt assessment materials are confidential and must be maintained in a secure location. Copying the portfolio contents for the purpose of IEP planning is permissible. The copy is to be maintained in the student's IEP file and may be shared with his or her parents and other members of the IEP team in accordance with federal and state confidentiality regulations. However, interfering with student responses or data is a violation of the security legislation. The portfolio contents must reflect authentic student work and progress.

1.5 STUDENT PARTICIPATION

The decision for a student to participate in the PACT-Alt is made by the student's IEP team and is documented in the IEP. To document that the PACT-Alt is appropriate for an individual student, the IEP team reviews all important information about the student over multiple school years and in multiple instructional settings (e.g., school, home, community) and determines that the student meet *all* of the following criteria:

- demonstrates cognitive ability and adaptive skills that prevent his or her being assessed on the basis of the state curriculum standards, even with accommodations and modifications;
- has current adaptive skills requiring extensive direct instruction in multiple settings to accomplish the application and transfer of skills necessary for functional application in school, work, home, and community environments;
- is unable to apply or use academic skills in natural settings without direct instruction in those settings; and

- is unable to be assessed on the basis of the state curriculum standards *not* as the result of excessive or extended absences or social, cultural, or economic differences.

If the student met the PACT-Alt participation criteria, the age criterion was then applied: in order to participate in the 2001–02 PACT-Alt, students had to be ages eight through thirteen as of September 1, 2001. If a student did not meet the age criterion, he or she was not required to take the PACT or the PACT-Alt.

Chapter 2

SCORING

This chapter describes the contents of the student portfolio and explains how they were reviewed to produce the final ratings for the students.

2.1 PORTFOLIO CONTENTS

The student's portfolio is the responsibility of the instructional team, not solely one person. While the student and special education teacher are major contributors, all members of the instructional team are involved in the development of portfolio entries.

A completed portfolio contains the following:

- One entry in ELA and one entry in mathematics that show evidence of the student's progress within standards-based instruction—that is, an ELA entry that is based on an IEP objective or a targeted skill that addresses communication instruction and a mathematics entry that is based on an IEP objective or a targeted skill that addresses the number and operations standards.
- A table of contents.
- A teacher-conducted interview with a family member or caregiver. A standard interview form was designed to ensure parental or caregiver input into the portfolio. The fact that no interview information is provided does not count against the student's scores.
- A portfolio validation form, which is provided to allow all participants in the assessment process to validate that the contents represented the student's instruction and assessment. Participants may be teachers, teacher assistants, therapists, parents, and school administrators. Signatures of the team members is preferred but not required. There is no penalty if the forms are not signed.
- The student's present mode of communication. The entries are required to provide evidence of how the student communicates with others (e.g., pictures, objects, gestures, words, signs). The student automatically receives a "below basic" rating (see section 2.3 for policy definitions) if his or her present mode of communication is not evident in the ELA entry.

Entries must include data collection sheets and graphs reflecting student progress within the four data collection periods in each content area. Additionally, entries must include evidence that the three program supports are being provided: the student is receiving standards-based instruction; the student is making choices as well as monitoring and evaluating his or her own work; and the student is receiving instruction in multiple settings with nondisabled peers or in the community. Evidence of program supports is collected throughout the year and may include student work, photographs, videotape, or other means to demonstrate how the student has made progress through standards-based instruction.

2.2 STANDARD SETTING AND POLICY DEFINITIONS

A committee that included representatives of various constituencies—special education teachers who were experienced in administering the PACT-Alt, the Council of Exceptional Children (CEC), special education directors, district test coordinators, parent organizations, the South Carolina Association of School Psychologists, the Council of Administrators of Special Education (CASE), and the PACT-Alt advisory committee—met on May 16, 2002, to determine how standards would be set for the PACT-Alt.

Inherent in any standard-setting process is a policy definition of each achievement level. Policy definitions serve as guidelines for judges to follow in making decisions about the cutoff scores and are typically presented to the judges before the standard setting takes place. The following are the policy definitions for the four performance levels of the PACT-Alt ELA and mathematics assessments:

- **Below basic.** A student who performs at the “below basic” level on the PACT-Alt has not met expectations for student performance based on the South Carolina curriculum standards.
- **Basic.** A student who performs at the “basic” level on the PACT-Alt has met minimum expectations on the South Carolina curriculum standards.
- **Proficient.** A student who performs at the “proficient” level on the PACT-Alt has met expectations on the South Carolina curriculum standards.
- **Advanced.** A student who performs at the “advanced” level on the PACT-Alt has exceeded expectations on the South Carolina curriculum standards.

After reviewing the options for standard setting, the committee made the following recommendations:

- The student progress rating should be the student’s achievement-level score (see above); therefore, it was not necessary to set cutoff scores as the rubric defined the performance levels.
- The three program-supports dimension ratings should each be reported separately from the student progress rating and should be provided as information on the individual student report. These three ratings are intended to evaluate and to provide feedback on whether the student’s instructional program was providing him or her with program supports in the three dimensions.

Score reports indicate levels of student progress as below basic, basic, proficient, or advanced. Final program-supports ratings are indicated numerically as 1, 1.5, 2, 2.5, 3, 3.5, or 4. Scorers can provide ratings of 1, 2, 3, and 4 only; these ratings correspond to the descriptions in the adjusted scoring guide in table 2.1. The decimal numbers that end with .5 are a result of averaging disparate ratings. (See section 2.3 about the scoring process for details.)

A benchmark committee composed of seventeen teachers, administrators, and higher education representatives met May 16–18, 2002, to identify exemplars for scoring and training. They scored approximately one hundred randomly selected portfolios and identified portfolio entries that represented each performance level in ELA and in mathematics. Based on the results of this

review, the committee provided input for the *Scoring Handbook for PACT-Alt* (2001b) and recommended adjustments to the scoring guide established during the 2000–01 PACT-Alt field test. The adjusted scoring guide (see table 2.1) was used to identify examples for scoring training sets and in the scoring process. The exemplar portfolios were compiled into a training manual for the scorers to use in scoring portfolios. The committee also provided recommendations for improvement in portfolio requirements and teacher training.

2.3 SCORING PROCESS

Thirty trained special education teachers and administrators from the Louisville, Kentucky, area scored 1,650 portfolios from June 3 through July 3, 2002, at the Louisville scoring center. Scorers were trained to use the revised scoring guide shown in table 2.1, below. The same guide is used for scoring all subject-matter entries. Each portfolio required at least thirty minutes to score. All scorers worked independently from the other scorers. However, if they had questions regarding their task, they could consult with one of the trainers.

The SDE sent staff members to the Louisville, Kentucky, scoring center to observe the hand scoring process. Three SDE staff members were present on June 3–7, 2002, while one SDE staff member was present on June 11–13 and June 26, 2002.

TABLE 2.1
PACT-Alt Scoring Guide 2001–02

Dimension	Score			
Part 1: Rating for Student Progress				
	Below Basic	Basic	Proficient	Advanced
Student Progress	Evidence of student progress on <i>functional</i> targeted skills is not clear or present	Student performance clearly evidences progress on <i>functional</i> targeted skills, supported by data within <i>three</i> quarters.	Student performance clearly evidences progress on <i>functional</i> targeted skills and demonstrates increased complexity, supported by data within <i>three</i> quarters.	Student performance clearly evidences progress on <i>functional</i> targeted skills and demonstrates increased complexity, supported by data within all four quarters.
Part 2: Ratings for Program Supports				
	1	2	3	4
Standards	<i>Little</i> evidence that the student’s functional targeted skill is taught within age-appropriate standards-based activities.	Student’s functional targeted skill is taught within several age-appropriate standards-based activities in <i>three</i> quarters.	Student’s functional targeted skill is taught within a wide variety of age-appropriate standards-based activities in <i>three</i> quarters.	Student’s functional targeted skill is taught within an extensive variety of age-appropriate standards-based activities in <i>four</i> quarters.
Opportunity for Student Self-Evaluation	There is <i>little</i> evidence that the student self-evaluates performance on the functional targeted skills by <ul style="list-style-type: none">• planning• monitoring• evaluating• using evaluation to improve performance	There is evidence that the student self-evaluates performance on the functional targeted skills by <ul style="list-style-type: none">• planning• monitoring• evaluating• using evaluation to improve performance	There is <i>clear</i> evidence that the student frequently self-evaluates performance on the functional targeted skills by <ul style="list-style-type: none">• planning• monitoring• evaluating• using evaluation to improve performance	There is <i>clear</i> evidence that the student consistently self-evaluates performance on the functional targeted skills by <ul style="list-style-type: none">• planning• monitoring• evaluating• using evaluation to improve performance
Multiple-Setting Instruction	There is evidence that the student has instruction and opportunity to perform the functional targeted skill only in specialized environments.	There is evidence that the student has instruction and opportunity to perform the functional targeted skill only in <i>two</i> settings.	There is clear evidence that the student has instruction and opportunity to perform the functional targeted skill in <i>three</i> settings, <i>one</i> of which must be with nondisabled peers or in the community.	There is clear evidence that the student has instruction and opportunity to perform the functional targeted skill in <i>four</i> or more settings, <i>one</i> of which must be with nondisabled peers or in the community.

Note: This scoring guide was used to score the required ELA and mathematics entries. Detailed descriptions of the scoring-guide terms can be found in the *Scoring Handbook for PACT-Alt* (2001b).

Rating for Student Progress

The final score in student progress for each subject requires an exact agreement between two scorers. Up to four scores are given in order for this exact agreement to be reached.

- If the first two scores are identical, then that is the reported score.
- If the first two scores are not the same, a third scorer scores the portfolio.
- If the third score is identical to one of the first two scores, then that is the reported score. Otherwise a fourth scorer scores the portfolio.
- If the fourth score is identical to one of the first three scores, then that is the reported score. Otherwise, all four scorers gave the student a different score. When all scores are different, the reported score is arrived at through a resolution committee consisting of trainers.

Table 2.2, below, gives three examples. The first example shows an exact match between the first and second scores, both of which are *below basic* (BB). Therefore, the final score is also *below basic*. In the second example, the first score is *basic* (B), and the second score is *below basic*. Because of the difference, a third score is obtained, *basic*. Since the first and the third scores match, the final score is *basic*. The third example has different first and second scores: *advanced* (A) and *basic* (B). A third score is therefore obtained, *proficient* (P), which does not match the first two. Consequently, a fourth score is obtained, *proficient*, which finally matches one of the first three scores, specifically the third score. Hence, the final score is *proficient*.

TABLE 2.2
Examples of Student Progress Ratings

Example Number	First Score	Second Score	Third Score	Fourth Score	FINAL Score
1	BB	BB	---	---	BB
2	B	BB	B	---	B
3	A	B	P	P	P

Legend: BB = below basic, B = basic, P = proficient, A = advanced

Ratings for Program Supports

Part 2 of the scoring guide, “Ratings for Program Supports,” evaluates effective practice. There are three scoring dimensions within this part:

- *Standards* addresses the opportunity that the program affords the student to receive instruction in standards-based activities.
- *Opportunity for student self-evaluation* addresses the opportunity the program affords the student to plan, monitor, evaluate, and use his or her evaluation to improve or focus on improvement.
- *Multiple-setting instruction* addresses the opportunity the program provides for the student to receive instruction in multiple settings.

Each dimension is scored numerically as 1, 2, 3, or 4. Unlike student progress, program supports can be scored using identical or adjacent scores. Scoring adjacently allows for scores to be off by 1 point. If the first two scores are off by more than 1 point, a third score is required and the third score becomes the reported score.

- If the first two scores are identical, then that is the reported score. If the first two scores are adjacent (off by 1 point), their average is the reported score.
- If the first two scores are neither identical nor adjacent, a third scorer scores the dimension. The third score is the reported score.

The same rules are used for each of the three program-supports dimensions. Table 2.3, below, provides three examples. In the first example, the first score is 2 and the second score is 3. These are adjacent scores; therefore the final score is 2.5. In the second example, the first score is 3 and the second score is 4. These are adjacent scores; therefore the final score is 3.5. In the third example, the first score is 1 and the second score is 3. These are not adjacent scores; therefore, the third score of 2 is final and serves as the reported score.

TABLE 2.3
Examples of Program-Supports Scores

Example Number	Dimension	First Score	Second Score	Third Score	FINAL Score
1	Standards	2	3	---	2.5
2	Opportunity for Student Self-Evaluation	3	4	---	3.5
3	Multiple-Setting Instruction	1	3	2	2.0

2.4 QUALITY CONTROL

Quality-control processes were used to ensure that all portfolios and score sheets could be accounted for at all times. Portfolios and score sheets were carefully inspected, tracked, monitored, and inventoried several times a day.

Detailed records of all scores given by each scorer were kept. The measure of scorer reliability used was the percentage of students who received exactly the same score or adjacent scores from the two scorers. These indexes, which were computed on a daily basis, served as the quality-control mechanism for monitoring the scorers' daily performance. Scorers who fell below the scorer reliability threshold of 90 percent for student progress and 80 percent for program-support dimensions were retrained.

As scoring progressed, the overall scorer reliability was computed using all of the data from the first day through the end of the current day. These cumulative reliabilities were used to show which areas of the scoring guide were causing the most difficulty (i.e., where disagreement is occurring most often) and which scorers were most frequently in disagreement with other scorers. This daily record was submitted electronically to the SDE at the close of each scoring day. MP scoring staff in collaboration with the SDE reviewed this record daily and gave general training reminders and identified scorers in need of retraining.

2.5 PERCENTAGE OF STUDENTS AT EACH PERFORMANCE LEVEL

Tables 2.4 and 2.5, below, provide the distribution of the students in the four achievement levels for each grade in ELA and mathematics respectively.

TABLE 2.4

ELA Student Progress: Percentage of Students at Each Overall Performance Level

Grade	N	Below Basic	Basic	Proficient	Advanced
3	337	35.0%	44.2%	15.7%	5.0%
4	267	33.3%	50.9%	12.7%	3.0%
5	380	37.9%	43.9%	13.9%	4.2%
6	262	40.8%	41.2%	11.8%	6.1%
7	169	33.7%	46.2%	13.6%	6.5%
8	168	38.7%	44.0%	12.5%	4.8%
3–8	1,583	36.6%	45.0%	13.6%	4.8%

Source: Measured Progress, Inc.

TABLE 2.5

Mathematics Student Progress: Percentage of Students at Each Performance Level

Grade	N	Below Basic	Basic	Proficient	Advanced
3	308	36.7%	42.2%	14.6%	6.5%
4	255	30.6%	52.2%	13.7%	3.5%
5	343	36.4%	48.4%	12.2%	2.9%
6	244	43.9%	45.1%	9.0%	2.0%
7	162	37.0%	44.4%	13.0%	5.6%
8	159	39.0%	45.3%	11.9%	3.8%
3–8	1,471	37.0%	46.4%	12.5%	4.0%

Source: Measured Progress, Inc.

Tables 2.6 and 2.7, below, provide the distribution of the students in the program-supports dimensions for each grade in ELA and mathematics respectively.

TABLE 2.6

ELA Program Supports: Percentage of Students in Each Score Category

	N	Score Category						
		1.0	1.5	2.0	2.5	3.0	3.5	4.0
Standards Dimension								
Grade 3	337	57.6%	20.2%	9.2%	4.7%	2.4%	4.5%	1.5%
Grade 4	267	55.4%	23.6%	11.6%	4.9%	0.7%	1.1%	2.6%
Grade 5	380	60.3%	19.7%	7.9%	4.2%	3.4%	2.9%	1.6%
Grade 6	262	66.0%	21.4%	4.6%	3.1%	0.8%	1.5%	2.7%
Grade 7	169	56.2%	22.5%	8.9%	5.9%	1.8%	1.2%	3.6%
Grade 8	168	58.9%	19.0%	6.5%	7.1%	2.4%	3.0%	3.0%
Grades 3–8	1,583	59.3%	21.0%	8.2%	4.7%	2.0%	2.5%	2.3%
Opportunity for Student Self-Evaluation Dimension								
Grade 3	337	25.2%	5.9%	1.8%	4.2%	12.2%	17.5%	33.2%
Grade 4	267	28.1%	5.2%	1.5%	5.6%	7.1%	17.2%	35.2%
Grade 5	380	34.5%	6.6%	1.8%	5.0%	7.6%	15.8%	28.7%
Grade 6	262	42.0%	5.0%	1.5%	5.0%	8.4%	14.5%	23.7%
Grade 7	169	27.2%	7.7%	4.7%	5.3%	12.4%	13.6%	29.0%
Grade 8	168	33.3%	5.4%	1.8%	5.4%	14.3%	13.1%	26.8%
Grades 3–8	1,583	31.8%	5.9%	2.0%	5.0%	9.9%	15.7%	29.8%
Multiple-Setting Instruction Dimension								
Grade 3	337	29.7%	16.9%	26.7%	5.3%	4.5%	5.3%	11.6%
Grade 4	267	28.1%	20.2%	23.2%	6.7%	3.0%	6.7%	12.0%
Grade 5	380	33.4%	16.6%	18.2%	7.9%	4.2%	6.1%	13.7%
Grade 6	262	43.9%	14.5%	17.2%	5.0%	4.2%	3.1%	12.2%
Grade 7	169	26.6%	20.1%	20.7%	7.1%	4.7%	6.5%	14.2%
Grade 8	168	29.8%	20.2%	20.2%	3.6%	1.2%	6.5%	18.5%
Grades 3–8	1,583	32.3%	17.7%	21.2%	6.1%	3.8%	5.6%	13.3%

Source: Measured Progress, Inc.

TABLE 2.7

Mathematics Program Supports: Percentage of Students in Each Score Category

		Score Category						
	N	1.0	1.5	2.0	2.5	3.0	3.5	4.0
Standards Dimension								
Grade 3	308	55.5%	22.1%	9.7%	3.6%	2.6%	3.2%	3.2%
Grade 4	255	56.1%	24.3%	9.4%	4.7%	2.7%	1.2%	1.6%
Grade 5	343	58.6%	21.6%	8.2%	4.7%	1.5%	2.0%	3.5%
Grade 6	244	69.3%	18.9%	5.3%	1.6%	0.8%	0.8%	3.3%
Grade 7	162	58.0%	25.3%	8.6%	2.5%	2.5%	0.6%	2.5%
Grade 8	159	58.5%	23.9%	6.3%	5.0%	1.9%	2.5%	1.9%
Grades 3–8	1,471	59.2%	22.4%	8.1%	3.7%	2.0%	1.8%	2.8%
Opportunity for Student Self-Evaluation Dimension								
Grade 3	308	25.0%	7.1%	1.6%	3.2%	13.3%	18.8%	30.8%
Grade 4	255	25.1%	6.7%	3.9%	3.1%	7.5%	19.6%	34.1%
Grade 5	343	29.7%	6.4%	2.6%	3.8%	7.3%	18.4%	31.8%
Grade 6	244	37.7%	5.7%	0.8%	4.1%	10.7%	16.4%	24.6%
Grade 7	162	27.2%	6.8%	3.7%	6.2%	12.3%	11.7%	32.1%
Grade 8	159	36.5%	5.7%	1.3%	1.3%	11.9%	14.5%	28.9%
Grades 3–8	1,471	29.7%	6.5%	2.3%	3.6%	10.2%	17.2%	30.5%
Multiple-Setting Instruction Dimension								
Grade 3	308	26.9%	21.8%	19.8%	9.4%	3.6%	6.5%	12.0%
Grade 4	255	29.8%	21.2%	20.0%	4.7%	2.7%	6.3%	15.3%
Grade 5	343	31.2%	19.0%	19.5%	6.7%	2.9%	6.7%	14.0%
Grade 6	244	40.2%	13.5%	19.3%	6.6%	4.5%	6.6%	9.4%
Grade 7	162	30.2%	17.3%	21.6%	5.6%	5.6%	5.6%	14.2%
Grade 8	159	32.7%	18.2%	15.7%	5.0%	4.4%	6.3%	17.6%
Grades 3–8	1,471	31.6%	18.8%	19.4%	6.6%	3.7%	6.4%	13.5%

Source: Measured Progress, Inc.

Chapter 3

RELIABILITY AND VALIDITY

3.1 RELIABILITY

Due to the nature of the scoring process, no internal consistency reliability measures are available for the data. The measure of reliability used is the exact agreement index—the percentage of students who received exactly the same score from the two initial scorers. Over all grade levels, the first and second scorers reached an exact agreement index of 61.6 percent (the sum of the entries prior to rounding along the diagonal in table 3.1) in ELA student progress and an exact agreement index of 63.2 percent (the sum of the entries prior to rounding along the diagonal in table 3.2) in mathematics student progress.

These exact agreement indexes pointed to the presence of inconsistencies within the scoring rubrics, a situation that made the portfolios difficult to score. As a result, the SDE will make adjustments to future scoring guides with the expectation of raising the exact agreement index threshold to 70 percent. Tables 3.1 and 3.2, below, show agreement data between the two initial scorers in ELA and mathematics respectively.

TABLE 3.1
ELA Student Progress: Interrater Agreement Indexes

		RATINGS BY SCORER 2			
		Below Basic	Basic	Proficient	Advanced
RATINGS BY SCORER 1	Below Basic	24.9%	8.2%	2.0%	0.3%
	Basic	9.7%	27.4%	3.8%	1.1%
	Proficient	2.1%	5.3%	6.9%	1.9%
	Advanced	0.3%	1.7%	2.0%	2.4%

Source: Measured Progress, Inc.

Note: N=1,583 for grades 3–8

TABLE 3.2
Mathematics Student Progress: Interrater Agreement Indexes

		RATINGS BY SCORER 2			
		Below Basic	Basic	Proficient	Advanced
RATINGS BY SCORER 1	Below Basic	26.8%	8.2%	1.2%	0.3%
	Basic	8.0%	28.1%	5.0%	1.1%
	Proficient	1.8%	5.1%	6.0%	1.9%
	Advanced	0.3%	1.8%	2.0%	2.2%

Source: Measured Progress, Inc.

Note: N=1,583 for grades 3–8

Tables 3.3 and 3.4, below, show the percentages for exact agreement and adjacent agreement (scores differing by 1 point) for ELA and mathematics respectively.

TABLE 3.3
ELA: Exact and Adjacent Agreement Indexes

Dimension	Exact Agreement Index	Adjacent Agreement Index	Sum of the Exact and Adjacent Agreement Indexes
Student Progress	61.6%	30.9%	92.5%
Standards	65.2%	26.2%	91.4%
Opportunity for Student Self-Evaluation	58.6%	23.0%	81.6%
Multiple-Setting Instruction	62.3%	27.7%	90.0%

Source: Measured Progress, Inc.

Note: N=1,583 for grades 3–8

TABLE 3.4
Mathematics: Exact and Adjacent Agreement Indexes

Dimension	Exact Agreement Index	Adjacent Agreement Index	Sum of the Exact and Adjacent Agreement Indexes
Student Progress	63.2%	30.2%	93.3%
Standards	66.4%	25.3%	91.7%
Opportunity for Student Self-Evaluation	58.7%	23.5%	82.3%
Multiple-Setting Instruction	60.8%	29.9%	90.8%

Source: Measured Progress, Inc.

Note: N=1,471 for grades 3–8

It is important to note that tables 3.1, 3.2, 3.3, and 3.4, above, provide interrater agreement indexes for the first two scorers only. Whenever the first two scorers did not arrive at the same or adjacent scores for the same student, score resolution methods described in section 2.3 were used to determine the student's final score.

3.2 VALIDITY

The PACT-Alt has two main purposes. First, it assesses student performance within the curriculum domains. The portfolio provides information that the IEP team can use to plan appropriate instruction. Second, the PACT-Alt was designed for use as part of an overall, uniform accountability system focused on program, rather than student, accountability. It is these two purposes against which validity should be assessed.

Content Validity

Content validity addresses the issue as to whether a particular measure or assessment procedure includes all the relevant content that the measure is supposed to represent and does not include irrelevant or contradictory content. The dual purposes of the PACT-Alt are expressed in the

content of the portfolio and in the portfolio scoring system. These, in turn, derive from two sources.

First, the content derives directly from the *Extensions and Adaptations of the South Carolina Curriculum Standards for Students Participating in Alternate Assessment* (SDE 1999). The portfolio and its evidentiary materials are organized around the three program-supports dimensions. These are the curriculum areas that were defined by the literature, by parents, and by teachers as being important content for students who meet the eligibility requirements for the PACT-Alt.

Second, the three program-supports dimensions derive from the special education literature and MP's twenty-five years of experience with the IDEA. These sources have provided guidance and support for best practices in special education.

Correlations among Domains

Tables 3.5 and 3.6, below, report the correlations among the domains in grades three through eight. Although the student progress ratings are expressed in terms of the ordinal categories "below basic," "basic," "proficient," and "advanced," weights of 0, 1, 2, and 3 respectively were assigned to the student progress ratings so that the correlations between student progress and the program-supports dimension scores could be computed.

TABLE 3.5
ELA: Between-Dimension Correlation Matrix

Dimension	Student Progress	Standards	Opportunity for Student Self-Evaluation	Multiple-Setting Instruction
Student Progress	1.00000	0.35378	0.33366	0.34729
Standards	0.35378	1.00000	0.29638	0.45780
Opportunity for Student Self-Evaluation	0.33366	0.29638	1.00000	0.44051
Multiple-Setting Instruction	0.34729	0.45780	0.44051	1.00000

Source: Measured Progress, Inc.

Note: N=1,583 for grades 3–8

TABLE 3.6
Mathematics: Between-Dimension Correlation Matrix

Dimension	Student Progress	Standards	Opportunity for Student Self-Evaluation	Multiple-Setting Instruction
Student Progress	1.00000	0.42281	0.37417	0.38218
Standards	0.42281	1.00000	0.25831	0.40952
Opportunity for Student Self-Evaluation	0.37417	0.25831	1.00000	0.45903
Multiple-Setting Instruction	0.38218	0.40952	0.45903	1.00000

Source: Measured Progress, Inc.

Note: N=1,471 for grades 3–8

3.3 SOUTH CAROLINA EDUCATION OVERSIGHT COMMITTEE REVIEW

The South Carolina Education Oversight Committee (EOC) has been mandated to review state assessment programs for their alignment with the state standards, level of difficulty, validity, and the ability to differentiate levels of achievement. The EOC is also required to make recommendations to the SDE for any needed changes. In June 2002, the EOC published a report (EOC 2002) that summarized three separate studies of the 2000–01 PACT-Alt field test.

These studies, which were conducted under the auspices of the EOC, consisted of the following:

- a review of the alignment between the PACT-Alt portfolio contents and the state’s curriculum standards, completed in October 2001 by committee of eleven special education administrators, teachers, assessment specialists, and the parents of children with severe disabilities;
- independent reviews of the PACT-Alt, carried out during October and November 2001 by two national experts, Dr. Sandy Thompson, research associate at the National Center on Educational Outcomes at the University of Minnesota, and Dr. Paula Burdette, technical assistance service coordinator for the Mid-South Regional Resource Center at the University of Kentucky; and
- a technical review of the 2000–01 PACT-Alt data by Dr. Edward Wolfe, of Michigan State University.

In the first study, the committee members were asked to review fifty-two portfolios randomly selected by MP and to identify the functional skills and standards assessed in these sample portfolios. The results showed that the PACT-Alt was aligned with the state’s curriculum standards.

In the second study, the two national experts were asked to address the following issues:

- the extent to which the PACT-Alt as an assessment fulfills the accountability requirements of the EAA;
- the extent to which the PACT-Alt reflects best practices in the assessment of students with severe disabilities; and
- the clarity and comprehensiveness of the design of the portfolio, the collection of evidence for the portfolio, and the scoring rubric and scoring guidelines.

Both reviewers came to favorable conclusions regarding the PACT-Alt. Burdette (2001) remarked that the PACT-Alt “appears to be a high quality alternate assessment system.” Thompson (2001) judged that overall, the PACT-Alt is “well aligned with standards with a comprehensive portfolio design.”

In the third study (Wolfe 2002), which involved a technical review of the data, the PACT-Alt was found to have an acceptably high reliability overall but relatively low interrater reliabilities. The latter is attributed to the fact that the 2000–01 field-test portfolios were scored by relatively inexperienced teachers. These interrater reliabilities were expected to improve—and did in fact improve—in 2001–02 as a result of professional scoring services arranged by MP. The PACT-Alt appears to have an appropriate difficulty level overall. No evidence was found to suggest that different demographic groups scored differently.

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